

REMARKS

Claims 1, 2, 4 and 6-10 are pending. By this Amendment, the specification and claims 1, 2 and 7 are amended. Claims 1 and 2 are amended to recite features supported in the specification at page 13, line 23 – page 14, line 18 and Fig. 4. Claim 7 is amended to correct informalities. No new matter is added by any of these amendments.

Reconsideration based on the following remarks is respectfully requested.

I. Amendment Entry after Final Rejection

Entry of this amendment is proper under 37 CFR §1.116 because the amendments: a) place the application in condition for allowance for all the reasons discussed herein; b) do not raise any new issues requiring further search or consideration; c) place the application in better condition for appeal if necessary; and d) address formal requirements of the Final Rejection and preceding Office Action.

The foregoing amendments do not raise any new issues after Final Rejection. Therefore, entry of the amendments is proper under 37 CFR §1.116 because the amendments place the application in condition for allowance. Accordingly, Applicant respectfully requests entry of this Amendment.

II. Request for Acknowledgement that References are Considered of Record

An Information Disclosure Statement with Form PTO-1449 was filed on November 15, 2004. The Examiner is requested to initial and return to the undersigned a copy of the subject Form PTO-1449.

III. The Specification Satisfies All Formal Requirements

The Final Office Action objects to the specification based on informalities. The specification has been amended to obviate the objection. Withdrawal of the objection to the specification is respectfully requested.

IV. The Claims Satisfy All Formal Requirements

The Final Office Action objects to claims 1 and 2 based on informalities. Claims 1 and 2 have been amended to obviate the objection. Withdrawal of the claim objection is respectfully requested.

V. Claims 1, 2, 4 and 6-10 Define Patentable Subject Matter

The Final Office Action rejects claims 1, 2, 7, 9 and 10 under 35 U.S.C. §102(b) over U.S. Patent 5,857,140 to Foster (hereinafter “Foster”). The Final Office Action rejects claims 1, 2, 7, 9 and 10 under 35 U.S.C. §102(b) over Japanese Patent Application 07-232082 to Houdaira *et al.* (hereinafter “Houdaira”). The Final Office Action further rejects claims 4, 6 and 8 under 35 U.S.C. §103(a) over Foster. These rejections are respectfully traversed.

Neither Foster nor Houdaira teaches or suggests an exhaust emission control system of an internal combustion engine, including at least, an exhaust gas purifying catalyst provided in an exhaust passageway of the internal combustion engine, a box body formed with an exhaust gas inlet and an exhaust gas outlet, a catalyst support incorporated into the box body, and a catalyst substance supported on said catalyst support, wherein a part of said catalyst support of said exhaust gas purifying catalyst is a low resistance area formed so that a gas flow resistance is lower than in other areas and disposed in such a position that a flow velocity of the exhaust gas flowing to said catalyst support is high, the low resistance area is a portion of the catalyst support in which the gas flow resistance is set lower than the catalyst substance by forming a notched portion in the catalyst support that is recessed from a face of the catalyst substance, and the notched portion is formed in a part of an exhaust gas end surface of the catalyst support, as recited in claim 1 for an inflow sided end surface, and similarly recited in claim 2 for an outflow sided end surface.

Instead, Foster discloses a catalytic converter 10 having an oval cross-section shaped by a housing 12 and terminating at edges 14. In particular, Foster teaches a cavity in the

housing 12 to enclose a ceramic substrate 18 that is coated with a high surface area material. The coating is catalyzed with a precious metal to purify the exhaust gases entering from the inlet face 20 and exiting the outlet face 22. The substrate 18 includes chamfered indentations at these faces. The substrate 18 is supported by a mat 24 in the form of a thermally expandable sleeve (col. 4, lines 24-64 and Figs. 1-3 of Foster).

Applicant respectfully asserts that Foster lacks a catalyst support that includes a low resistance region that enables exhaust gases to pass through more readily than through the catalyst substance. Further Applicant asserts that Foster does not teach or suggest the low resistance region as being recessed from the catalyst substance.

Further, Houdaira discloses a catalyst converter 1 having first and second carriers 10, 20. In particular, Houdaira teaches an end face 21 showing a cylindrical recess region 12 (Abstract and drawing 1 of Houdaira). Houdaira teaches only an upstream side of an end surface of a second carrier 20, which is rapidly exposed to the exhaust gas from the first carrier 10, so as to improve the activation of the catalyst.

However, Applicant asserts that Houdaira lacks any corresponding configuration to the notched portion that is recessed from the catalyst substance, as provided in Applicant's claimed features. Nor does Houdaira provide for a low resistance area, as provided in Applicant's claimed features. Instead, in order to communicate between inlet 30 to outlet 31, Houdaira requires the gas to flow through the first carrier 10.

Further, there is no motivation to modify features related to the coated substrate of Foster to achieve the features of dependent claims 4 and 6 regarding the proportional quantity of catalyst, and the features of dependent claim 8 regarding the shape of the notched portion. Applicant respectfully asserts that the Final Office Action has not established sufficient motivation to modify Foster or to provide a *prima facie* case of obviousness.

For at least these reasons, Applicant respectfully asserts that the independent claims are now patentable over the applied references. The dependent claims are likewise patentable over the applied references for at least the reasons discussed as well as for the additional features they recite. Consequently, all the claims are in condition for allowance. Thus, Applicant respectfully requests that the rejections under 35 U.S.C. §§102 and 103 be withdrawn.

VI. Conclusion

In view of the foregoing amendments and remarks, Applicant respectfully submits that this application is in condition for allowance. Favorable consideration and prompt allowance are earnestly solicited.

Should the Examiner believe that anything further is desirable in order to place this application in even better condition for allowance, the Examiner is invited to contact Applicant's undersigned representative at the telephone number listed below.

Respectfully submitted,



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JAO:GWT/gwt

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